This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (Currently amended) A photo-catalyst containing a titanium ~~fluoride nitride~~ (IV) compound comprising, $Ti(IV)O_aN_bF_c$ or a compound represented by $MeTi(IV)O_aN_bF_c$ prepared by doping at least one metal Me selected from the group consisting of alkali or alkaline earth metals on $Ti(IV)O_aN_bF_c$, wherein, b is 0.1 to 1, c is 0.1 to 1 and a is a value to maintain Ti(IV) and is decided in relation to b and c.

2. (Currently amended) The photo-catalyst ~~containing titanium fluoride nitride~~ of claim 1 ~~to which~~ further comprising at least one promoter selected from the group consisting of Pt, Ni and Pd ~~is loaded~~.

3. (Currently amended) The photo-catalyst ~~containing titanium fluoride nitride~~ of claim 1, wherein $Ti(IV)O_aN_bF_c$ possesses ~~anataze~~ anatase structure and $MeTi(IV)O_aN_bF_c$ possesses perovskite to ~~anataze~~ anatase structure.

4. (Currently amended) The photo-catalyst ~~containing titanium fluoride nitride~~ of claim 3 ~~to which~~ further comprising at least one promoter selected from the group consisting of Pt,

Ni and Pd ~~is loaded~~.

5. (Currently amended) A photo-catalyst for water splitting containing a titanium ~~fluoride nitride~~ (IV) compound comprising, $Ti(IV)O_aN_bF_c$ or a compound represented by $MeTi(IV)O_aN_bF_c$ prepared by doping at least one metal Me selected ~~from the~~ from the group consisting of alkali or alkaline earth metals on $Ti(IV)O_aN_bF_c$, wherein, b is 0.1 to 1, c is 0.1 to 1 and a is a value to maintain Ti(IV) and is decided in relation with b and c.

6. (Currently amended) The photo-catalyst for water splitting ~~containing titanium fluoride nitride~~ of claim 5 ~~to which~~ further comprising at least one promoter selected from the group consisting of Pt, Ni, Ru and Pd ~~is loaded~~.

7. (Currently amended) The photo-catalyst for water splitting ~~containing titanium fluoride nitride~~ of claim 5, wherein $Ti(IV)O_aN_bF_c$ possesses ~~anataze~~ anatase structure and $MeTi(IV)O_aN_bF_c$ possesses perovskite to ~~anataze~~ anatase structure.

8. (Currently amended) The photo-catalyst for water splitting ~~containing titanium fluoride nitride~~ of claim 7 ~~to which~~ further comprising at least one promoter selected from the group consisting of Pt, Ni and Pd ~~is loaded~~.

9. (Currently amended) A method for preparation of a photocatalyst represented by Ti(IV)$O_aN_bF_c$, wherein ~~a, b and c are same as to claim 1 by~~ b is 0.1 to 1, c is 0.1 to 1 and a is a value to maintain Ti(IV) and is decided in relation to b and c, comprising baking titanium di-ammonium fluoride halide represented by ~~$(HH_4)_2TiF_dX_{6-d}$~~ $(NH_4)_2TiF_dX_{6-d}$, wherein, d is 1-6, and which contains at least F and ammonium halide by the ratio of equimolar or by the ratio of slightly excess of ammonium halide, at the maximum temperature from 200°C to 500°C ~~so as to form~~ whereby a starting material is formed, ~~then~~ followed by nitrogenating said starting material ~~is nitrogenated~~ by thermal synthesis in ammonia atmosphere containing from 0.02% to 10.00% of oxygen, air or water to ammonia by reduced mass to oxygen atom at the maximum temperature from 350°C to 700°C for over than 5 hours.

10. (Currently amended) A method for preparation of a photocatalyst represented by SrTi(IV)$O_aN_bF_c$, wherein, ~~a, b and c are same as to claim 1, by~~ b is 0.1 to 1, c is 0.1 to 1 and a is a value to maintain Ti(IV) and is decided in relation to b and c, comprising baking titanium di-ammonium fluoride halide represented by TiF_xX_{6-x} and/or ~~$(HH_4)_2TiF_dX_{6-d}$~~ $(NH_4)_2TiF_dX_{6-d}$, wherein x and d are1-6, and which contains at least F, and at least one compound selected from the group consisting of SrO, SrOH and SrX so as to form a starting material or $SrTiF_6$, ~~then~~ followed by nitrogenating said starting material or $SrTiF_6$ ~~is nitrogenated~~ by

thermal synthesis in ammonia atmosphere containing from 0.02% to 10.00% of oxygen, air or water to ammonia by reduced mass to oxygen atom at the maximum temperature from 350°C to 700°C for over than 5 hours.